DERWENT-ACC-NO: 1994-213001

DERWENT-WEEK: 199426

COPYRIGHT 1999 DERWENT INFORMATION LTD

TITLE: Moulding of semiconductor device - includes nipping vertical lead frame carrying chip between mould pair to form cavity around chip, filling with resin melt etc.

PATENT-ASSIGNEE: SONY CORP[SONY]

PRIORITY-DATA: 1992JP-0321348 (November 6, 1992)

PATENT-FAMILY:

PUB-NO PUB-DATE LANGUAGE PAGES MAIN-IPC JP 06151492 A May 31, 1994 N/A 011 H01L 021/56

APPLICATION-DATA:

PUB-NO APPL-DESCRIPTOR APPL-NO APPL-DATE JP06151492A N/A 1992JP-0321348 November 6, 1992

INT-CL_(IPC): B29C045/02; B29C045/26; B29C045/34; B29L031:34; H01L021/56

ABSTRACTED-PUB-NO: JP06151492A

BASIC-ABSTRACT: A lead frame 5 on which a semiconductor chip 15 is mounted is nipped between a pair of moulds 1 and 2 arranged facing each other. A cavity 13 formed in a state to surround the semiconductor chip and is filled with resin 16. The semiconductor chip 15 is embedded in a moulded prod.

In the moulding method for the semiconductor, the lead frame 5 is vertically arranged and the resin 16 is injected in the cavity from the under side of the cavity 23.

USE/ADVANTAGE - Since a cavity is filled with resin from below toward above, unevenness in resistance against filling of the cavity with the resin can be suppressed to a min through the action of gravity and filling with the resin in a uniform state is practicable. Generation of voids and formation of an unfilled part do not occur. Lowering of reliability on a function due to defective sealing does not occur and yield is improved.

CHOSEN-DRAWING: Dwg.7/12

TITLE-TERMS:

MOULD SEMICONDUCTOR DEVICE NIP VERTICAL LEAD FRAME CARRY CHIP

MOULD PAIR FORM CAVITY CHIP FILL RESIN MELT

DERWENT-CLASS: A32 A85 L03 U11

CPI-CODES: A11-B11; A12-E04; A12-E07C; L04-C20D;

EPI-CODES: U11-E02A1;

ENHANCED-POLYMER-INDEXING:

Polymer Index [1.1]

017; P0000; S9999 S1387

Polymer Index [1.2]

017; ND07; N9999 N7170 N7023; Q9999 Q7523; Q9999 Q7476 Q7330

; N9999 N6542 N6440 ; N9999 N5856

POLYMER-MULTIPUNCH-CODES-AND-KEY-SERIALS:

Key Serials: 0229

2462

2510

2738

3241

3279

Multipunch Codes: 017

03-

437

456

458

52-

54&

58&

602

623

627

SECONDARY-ACC-NO:

CPI Secondary Accession Numbers: C1994-097756 Non-CPI Secondary Accession Numbers: N1994-167867

09/08/2001, EAST Version: 1.02.0008